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# ECONOMIC IMPACT OF MEDICAID ON MONTANA AND ON THE BILLINGS, BUTTE, AND MILES CITY HEALTHCARE MARKET AREAS

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#### ECONOMIC IMPACT OF MEDICAID ON MONTANA

#### PART I: BASELINE MEASURES

This study analyzes the impact of Medicaid on Montana income and jobs throughout the state and on jobs and income in the Billings, Butte, and Miles City healthcare market areas. Medicaid as a proportion of direct spending on healthcare has increased dramatically in Montana where the program now represents about 17 percent of the approximately \$3.3 billion total healthcare spending in the state. The federal dollar share ranges from 73 to 80 percent of Medicaid expenditures and represents an outside infusion of dollars into the Montana economy. Federal Medicaid dollars are an external source of demand for Montana healthcare goods and services and support healthcare industry jobs. Jobs in healthcare affect jobs and income throughout the state and in different healthcare market areas.

The high paid jobs in Montana's hospitals and other healthcare sectors have an important economic development impact on the state economy. The high paid hospital and other healthcare sector jobs affect other businesses that sell goods and services to healthcare providers and business that healthcare workers buy from. Thus there is a multiple impact of healthcare on the Montana's economy and within regional markets.

#### HEALTHCARE INDUSTRY BASELINE MEASURES FOR MONTANA

- A) The current estimated level of \$560 million in total Medicaid spending in 2002 represents \$420 million federal dollars of outside spending coming into the state economy. Overall the federal match supports more than 9,172 healthcare jobs in Montana. Healthcare jobs pay an average of \$29,080 annually→the 9,172 healthcare jobs dependent on the Medicaid federal match represent \$267 million in income. These healthcare jobs account for another 4,297 in other industries through the economic ripple effect. The 9,172 healthcare jobs plus the additional 4,297 jobs (at an annual average income of \$25,194) for a total of 13,469 jobs represent \$375 million in income for Montanans through the economic ripple effect.
- B) The 9,172 healthcare jobs dependent on Medicaid federal dollars represent 22 percent of the 36,000 jobs in the state's healthcare industry.
- C) The 9,172 healthcare jobs dependent on the Medicaid federal match are distributed over several sectors: 1,602 jobs in hospitals throughout the state, 3,257 jobs in nursing homes, 392 jobs in physician and other healthcare professional offices, and 3,921 jobs in home care, medical labs, outpatient care centers, and care facilities for mental health, substance abuse, and other services.

#### **HEALTHCARE INDUSTRY BASELINE MEASURES FOR BILLINGS**

- D) The Medicaid federal match supports 1,679 healthcare jobs in the Billings regional economy and \$67.7 million in healthcare income. The multiplier effect of the 1,679 healthcare jobs on employment throughout the Billings economy is an additional 793 jobs representing another \$20 million in income. The total employment impact of Medicaid federal match dollars on Billings employment is 2,472 jobs representing \$87.3 million in income for workers in all industries-including healthcare-throughout the Billings region.
- E) The 1,679 healthcare jobs in the Billings regional economy are distributed over several sectors: 369 jobs in the two hospitals, 90 jobs in physician and other health care professional offices, 554 jobs in nursing homes, and 667 jobs in home care, medical labs, outpatient care centers, and care facilities for mental health, substance abuse, and other services.

#### **BUTTE AND MILES CITY BASELINE MEASURES**

- F) The Medicaid federal match supports more than 539 jobs throughout the <u>Butte</u> regional economy and \$15 million in income for workers in all industries in the Butte region.
- G) Of the 539 jobs throughout the <u>Butte</u> regional economy 367 are in healthcare. These high paid jobs represent \$10.6 million out of the \$15 million income for workers in all industries.
- H) The 367 healthcare jobs in the <u>Butte</u> regional economy are distributed over several sectors: 64 jobs in the hospital, 16 jobs in physician and other health care professional offices, 130 jobs in nursing homes, and 157 jobs in home care, medical labs, outpatient care centers, and care facilities for mental health, substance abuse, and other services.
- I) The Medicaid federal match supports more than 404 jobs throughout the <u>Miles</u> City regional economy and \$11.2 million in income.
- J) Of the 404 jobs throughout the Miles City regional economy 275 are in healthcare. These relative high paid jobs represent \$8 million out of the \$11.2 million income.
- K) The 275 healthcare jobs in the Miles City regional economy are distributed over several sectors: 48 jobs in the hospital, 12 jobs in physician and other health care professional offices, 98 jobs in nursing homes, and 118 jobs in home care, medical labs, outpatient care centers, and care facilities for mental health, substance abuse, and other services.

#### **BILLINGS, BUTTE, & MILES CITY BASELINE MEASURES COMBINED**

- L) The Medicaid federal match supports more than 3414 total jobs in the three market areas of Billings, Butte, and Miles City.
- M) Of these 3,414 total jobs 2,321 are in the healthcare industry.
- N) Of the 2,321 healthcare industry jobs, 481 are in hospitals.

#### **MONTANA-STATEWIDE HOSPITAL BASELINE MEASURES**

- O) The federal match from Medicaid supports 1,602 hospital jobs throughout the state. These high paid jobs represent \$49 million in income to healthcare workers throughout the state.
- P) The employment multiplier effect of the 1,602 hospital jobs is 2,243 jobs throughout all Montana industries including healthcare. The combined, ripple effect on income from Medicaid supported jobs in hospitals is equal to \$65 million, which includes the \$49 million from hospital jobs directly.

#### **BILLINGS HOSPITAL BASELINE MEASURES**

- Q) The 369 jobs in the two Billings hospitals that are supported by Medicaid affect a cumulative total of 516 jobs—which includes the 369 hospital jobs—throughout the Billings economy.
- R) The 369 Billings hospitals jobs –at an annual average income of \$40092--supported by Medicaid represent \$14.8 million in income to the Billings regional economy. The total income from the ripple effect of hospital jobs is \$18.5 million-this includes the \$14.8 million from hospital jobs.

#### PART II IMPACT OF MEDICAID BUDGET CUTS

Reductions in state appropriated Medicaid expenditures result in reductions in federal dollar expenditures in the state economy, which, in turn, reduces jobs and income in healthcare. The loss of high paid jobs in Montana's healthcare industry affects other businesses that sell goods and services to healthcare providers. Thus there is a multiple impact on the economy. The following major impacts from Medicaid spending impacts are computed for a <u>low</u> budget cut scenario of 15% cut in state budget (loss of \$58 million in federal match dollars) and a <u>high</u> budget cut scenario of 20% cuts in state Medicaid budget (loss of \$78 million in federal match dollars) on the Montana economy include:

A) The loss of jobs in Montana healthcare industry will range from a low of 1,411 jobs to a high of 1,898 jobs with an associated income loss of \$41 million to \$55.2 million in healthcare industry income. The total multiplier or ripple effect of job loss will be

- from 2,072 jobs to 2,782 jobs –including those in healthcare—throughout all industries with income losses of \$57.7 million to \$77.6 million.
- B) The hospital sector statewide will lose from 247 to 332 jobs with accompanying ripple effects on total employment—including healthcare—of 345 to 464 jobs. The income loss in the hospital sector will be from (low cut scenario) \$7.1 million to \$10 million (high cut) with associated ripple effects on total income of \$9.6 million to \$13.3 million of lost income in the state economy

#### **BILLINGS JOB AND INCOME LOSS**

- C) The loss of jobs in the Billings healthcare industry will range from a low of 258 jobs to a high of 347 jobs with an associated income loss of \$10.4 million to \$14 million in healthcare industry income. The total multiplier or ripple effect of job loss in the Billings regional economy will be from 380 jobs to 511 jobs –including those in healthcare—throughout all industries with income losses of \$13.4 million to \$18.1 million.
- D) The Billings hospital sector statewide will lose from 57 to 76 jobs with accompanying ripple effects on total employment—including healthcare—of 80 to 107 jobs. The income loss in the hospital sector will be from (low cut scenario) \$2.3 million to \$3.1 million (high cut) with associated ripple effects on total income of \$2.9million to \$3.9 million of lost income in the Billings economy

#### **BUTTE AND MILES CITY JOB AND INCOME LOSS**

- E) The loss of jobs in the <u>Butte</u> healthcare industry will range from a low of 56 jobs to a high of 76 jobs with an associated income loss of \$1.6 million to \$2.2 million in healthcare industry income. The total multiplier or ripple effect of job loss in <u>Butte</u> will be from 83 to 111 jobs –including those in healthcare—throughout all industries with an income loss of \$2.3 to \$3.1 million.
- F) The loss of jobs in the <u>Miles City</u> healthcare industry will range from a low of 42 to a high of 57 jobs with an associated income loss in the local economy of \$1.2 million to \$1.7 million in healthcare industry income. The ripple effect of healthcare job loss in <u>Miles City</u> will be from 62 to 84 jobs with income losses of \$1.7 to \$2.3 million throughout all businesses in the <u>Miles City</u> local economy.

#### ECONOMIC IMPACT OF MEDICAID ON MONTANA

Increased Medicaid program expenditures in a situation of weakening state finances have resulted in proposed cuts to reduce Medicaid expenditures in Montana. The effect of such cuts on Montanans who rely on Medicaid for healthcare is a major concern of expenditure reductions in this healthcare access program for low-income households and families. Reductions in Medicaid expenditures will also affect the state economy, Montana's healthcare industry, and different health market areas in terms of employment and income.

Medicaid expenditures are a net job and income generator for Montanan. The federal dollar match represents and a spending injection into Montana's and its regional markets. Reduced Medicaid spending and the loss of federal dollars represent a loss of spending in local economies. The initial dollar impact of reduced Medicaid spending depends on the federal 'match rate' or the federal dollar commitment per state dollar contributed to the program. In Montana, 2.7 federal dollars are lost for every state dollar cut from the Medicaid budget and 4 federal dollars are lost for every dollar cut from the Children's Health Insurance Program.

**I. BASELINE DATA TABLES** The impact of Medicaid federal match dollars on employment and income are shown in Table 1.

Table 1 Jobs & Income Dependent on Medicaid Federal Match Dollars, 2003

Region	Healthcare		All Industries		
	Jobs	\$Income	Jobs*	\$Income*	
Montana	9172	\$267 m	13469	\$375 m	
Billings	1679	\$67.3 m	2472	\$87.3 m	
Butte	367	\$10.6 m	539	\$15 m	
Miles City	275	\$8 m	404	\$11.2 m	

<sup>\*</sup> Jobs & Income numbers include hospitals; data source Montana Department of Labor and Industry and Montana IMPLAN Model; \$ in millions

Federal match dollars from Medicaid affect jobs and income in hospitals throughout the state and in regional healthcare markets. Hospital jobs are relatively high paid and have a multiplier effect on other jobs that supply goods and services to hospitals. The income created by hospital jobs also has a multiplier or ripple effect on income throughout the economy. Table 2 illustrates the job and income impact of federal match dollars in the hospital sector and on other sectors through the economic ripple effect.

Table 2 Hospital Jobs & Income Dependent on Medicaid Federal Match Dollars, 2003

Region	Hospitals		All Industries		
	Jobs	\$Income	Jobs*	\$Income*	
Montana	1602	\$49 m	2243	\$65 m	
Billings	369	\$14.8	516	\$18.5 m	
Butte	64	\$1.8 m	90	\$2.5 m	
Miles City	48	\$1.4 m	67	\$1.9 m	

<sup>\*</sup> Jobs & Income numbers include hospitals; data source Montana Department of Labor and Industry and Montana IMPLAN Model; \$ in millions.

# II. MEDICAID BUDGET CUT TABLES

Reductions in Medicaid spending will result in the loss of jobs in the state's healthcare industry. This loss of relatively high paid jobs will have secondary or 'multiplier' effects as declining expenditures are translate into economy-wide impacts. Decrease in spending by health care workers and reduced purchases by healthcare businesses lead to lower incomes and employment in other sectors of the economy. The loss of high paid jobs and the multiplier effects on other jobs will be especially painful in major health care markets like Billings that serves all of south central and eastern Montana as well as northern Wyoming as a major healthcare center.

The loss of jobs and income throughout the state and within the Billings healthcare market areas will also affect other regional markets such as Butte

and Miles City which are linked to the Billings market through patient referrals and institutional affiliations such as St. Vincent healthcare network of hospitals in those market areas. Estimates of the statewide and market area impacts can be made with the IMPLAN model for the Montana, which allows us to look at the effects of changes in federal expenditures on Montana industries and regions.

## A. 15% Budget Cut Scenario

The 15% cut represents the reduction in state Medicaid spending going into the 2003 Legislative session. It is made up of two basic elements: a) reductions in the state Medicaid budget from the FY 2002 and FY 2003 Medicaid budgets plus b) the cuts in FY 2004 and FY 2005 as proposed in the Governor's Budget going into the January session. The dollar reduction in state Medicaid spending under this scenario represents a loss of \$58 million dollars in federal match. The 15% budget cut scenario may well turn out to be a minimum budget cut once the Legislature is in session and bargaining begins on tradeoffs between healthcare and other state program areas.

Table 3: 15 % CUT in State Medicaid: Loss of Jobs & Income 2003

Region	Healthcare		All Industries		
	<u>Jobs</u>	\$Income	Jobs*	\$Income*	
Montana	-1411	-\$41 m	-2072	-\$57.7	
Billings	-258	-\$10.4	-380	-\$13.4	
Butte	-56	-\$1.6	-83	-\$2.3	
Miles City	-42	-\$1.2 m	-62	-\$1.7	
	Hospitals		All Industries		
	<b>Jobs</b>	Jobs \$Income		\$Income*	
Montana	-247	-\$7.1 m	-345	-\$9.6 m	
Billings	-57	-\$2.3 m	-80	-\$2.9 m	
Butte	-10	-\$.3 m	-14	-\$.5 m	
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Miles City	-7	-\$.2 m	-10	-\$.3 m	
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<sup>\*</sup> Jobs & Income numbers include hospitals; data source Montana Department of Labor and Industry and Montana IMPLAN Model; \$ in millions

# **B. 20% Budget Cut Scenario**

The 20% cut is a larger budget cut scenario and is an order of magnitude that might occur if the budget wheeling and dealing gets desperate and stringent in the 2003 Legislative session. The 20% cut in state Medicaid spending represents a \$78 million loss in federal match dollars.

Table 4
20 % Cut in State Medicaid Budget
Loss of Jobs and Income, 2003

Region	F	<b>Healthcare</b>	All Industries		
	<u>Jobs</u>	\$Income	Jobs*	\$Income*	
Montana	-1898	-\$55.2 m	-2782	-\$77.6 m	
Billings	-347	-\$14 m	-511	-\$18.1 m	
	7				
Butte	-76	-\$2.2 m	-111	-\$3.1 m	
Miles City	-57	-\$1.7 m	-84	-\$2.3 m	
	Hospitals		All Industries		
	Jobs	Jobs \$Income		\$Income*	
Montana	-332	-\$10 m	-464	-\$13.3 m	
Billings	-76	-\$3.1 m	-107	-\$3.9 m	
Butte	-13	-\$.4 m	-19	-\$.6 m	
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Miles City	-10	-\$.3 m	-14	-\$.4 m	

<sup>\*</sup> Jobs & Income numbers include hospitals; data source Montana Department of Labor and Industry and Montana IMPLAN Model; \$ in millions.

# **Methodological Note**

Medicaid expenditures are a net job and income generator for Montana. The federal dollar match from Medicaid represents a spending injection into Montana's economy and it's regional markets. The initial dollar impact of

reduced Medicaid spending depends on the federal 'match rate' or the federal dollar commitment per state dollar contributed to the program. In Montana, 2.65 federal dollars are lost for every state dollar cut from the Medicaid budget and 4 federal dollars are lost for every dollar cut from the Children's Health Insurance Program. Estimates of the statewide and market area impacts were made with the Montana IMPLAN model, used by the Montana Department of Labor Industry. The IMPLAN inter-industry model allows us to look at the effects of changes in federal expenditures including Medicaid expenditures on Montana industries and regions.

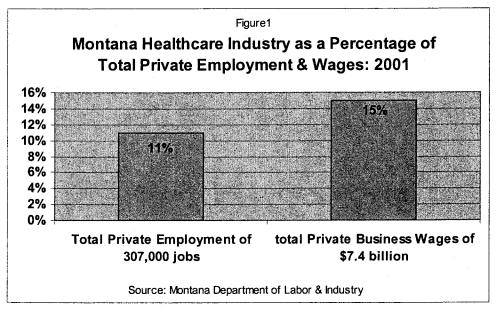


Figure 1:

- →The healthcare industry accounts for 11 percent of all jobs in the non-government, private business job sector;
- → These high paid healthcare jobs account for an even larger 15 percent share of total wages paid by Montana businesses in 2001

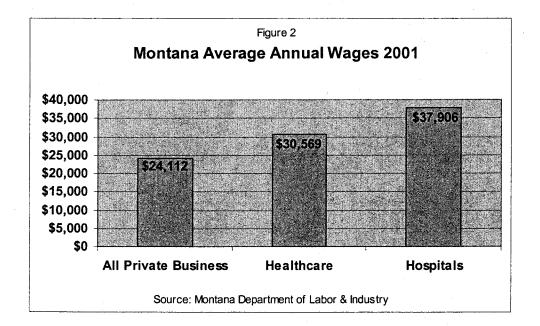


Figure 2:

- → Healthcare industry jobs pay 25 percent more than the average annual wage in the Montana economy;
- →Hospital jobs are some of the highest paid jobs in the state with an annual average of \$37,906 in 2001, a wage that was 60 percent higher than the average annual wage.

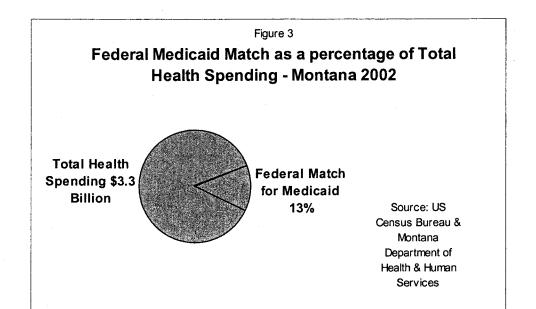


Figure 3:

- → The Federal government dollar match for Medicaid is over \$400 million and represents 13 percent of all healthcare spending in Montana in 2002
- →The loss of federal match dollars through cuts in the state Medicaid budget will have significant negative impacts on high paid healthcare and hospital jobs and income

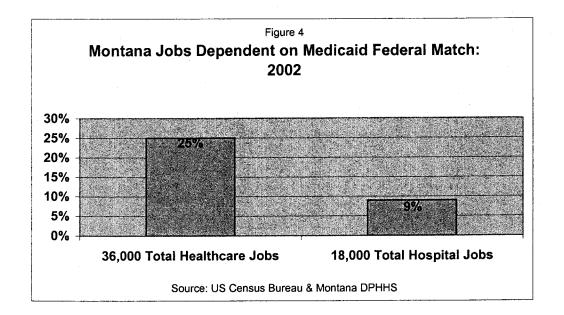
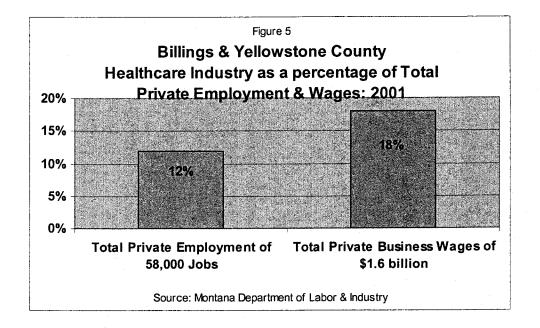


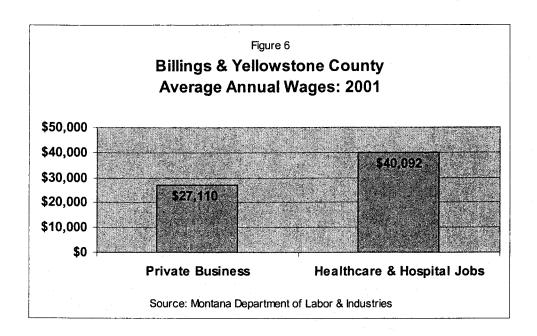
Figure 4:

- →25 percent of the 36,000 healthcare industry jobs are dependent on Medicaid federal match dollars;
- → Almost 10 percent of the hospital jobs in Montana are dependent on Medicaid federal match dollars.



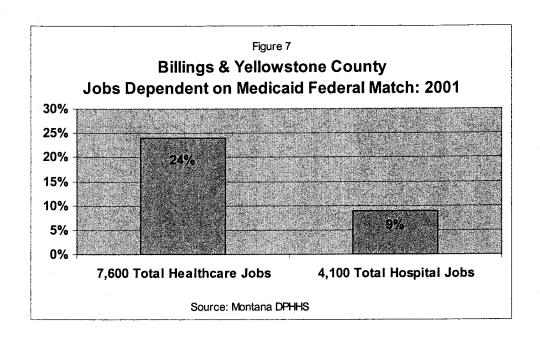
#### Figure 5:

→ Healthcare is a major employer in the Billings-Yellowstone County economy accounting for 12 percent of all private business employment in the region in 2001; → The high paid jobs in healthcare with an annual average of \$40,092 per year account for 18 percent of total private business wages in the Billings economy.



# Figure 6:

→ Healthcare and hospital jobs in the Billings-Yellowstone County economy pay \$40,092 per year, about 50 percent higher than the average annual wage in all private business jobs in the region.



## Figure 7:

- →Almost 1/4 of the healthcare jobs in the Billings region are dependent on federal Medicaid match dollars;
- →About 10 percent of the high paid hospital jobs in the Billings economy are dependent on federal Medicaid match dollars.

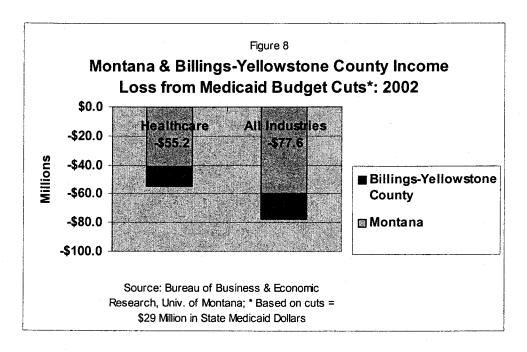
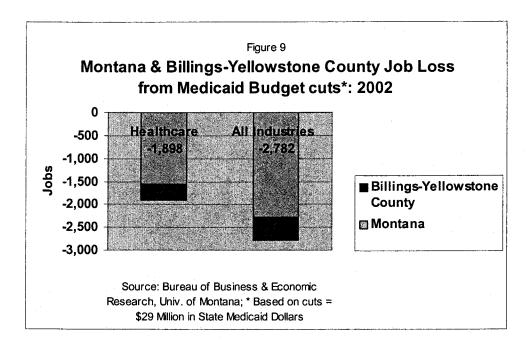


Figure 8:

→Job loss in the healthcare industry statewide from Medicaid budget cuts will be slightly under 1900 jobs; 347 of these lost jobs are in the Billings regional economy →Job loss in all industries throughout Montana from the loss of federal match dollars will be 2,782 jobs; 511 of these lost jobs will be in Billings.



#### Figure 9:

- →Total labor income lost in Montana's healthcare industry from Medicaid budget cuts will be \$55 million; \$14 million of this lost will be in Billings;
- → Total labor income lost throughout all Montana industries from Medicaid budget cuts will be \$77.6 million with \$18.1 million of this loss occurring in the Billings-Yellowstone County region.